

# Z-Wave

## Smart Home Kit



### ***Smart Home Total Solution***

The Smart Home Kit includes a pan/tilt Z-Wave camera, a Z-Wave power plug and a Z-Wave 4in1 sensor.

The Z-Wave Pan/Tilt IP Camera is a Smart Home Solution on a Camera (SoC). This is an IP camera with Z-Wave controller/gateway functions integrated inside. With this camera, you can control/monitor all Z-Wave devices in your house through your iPhone/iPad and Android mobiles/pads.

The basic setup of this camera is truly 1-2-3 :

1. Connect the camera to the network
2. Download the app **mCamView Z+** into your iPhone/iPad or Android
3. View video of the camera and control/monitor the Z-Wave devices.

Z-Wave technology is an innovative wireless communication protocol for smart home usage. With this technology integrated, the Z-Wave camera can easily

control/monitor all Z-Wave devices, including door-lock, curtain, lighting, power plug, electronics and sensors.

The push notification is supported, so that you will get the notification from your iPhone/iPad and Android once there is any events detected through the motion or sound detector on the camera or any Z-Wave sensors, even when your mobile is on sleep mode.

The SD card recording is supported, and you could playback the recorded video on your iPhone/iPad and Android. You could also do the SD card recording only when there is motion or sound detection to save the SD card storage size. The motion and sound detected recording has a 5 seconds pre-recording, so that you will always catch the critical moment.

The NAS storage is supported. You can record the video files into any normal NAS devices. And you can playback those recorded video files remotely on your mobile devices or computers.

For day & night usage, there are two video sensors/lens on the camera, one for day and one for night. The day lens and night lens focus are separately tuned for day light and Infra Red light for best video quality. No ICR, no mechanical problem.

Two-way audio is supported. You can monitor the synchronized video/audio and talk to or warn the people around the camera from your iPhone/iPad and Android once you got the push notification. There is a built-in speaker for this two way audio usage and also for speaker alarm usage.

The WPS(WiFi Protected Setup) is supported. You could set up the WiFi connection of the camera with the router by clicking the WPS button on the camera and on the router at the same time. No more complicated WiFi configuration.

The Z-Wave IP camera is ideal for your smart home usage, integrating the usage of all the available Z-Wave devices in the market will make the application infinite and make your home life out of your imagination.

## ***Features***

- Camera with Z-Wave controller/gateway functions integrated.

- Support Zwave devices control, room control and scene control.
- Control up to 20 Z-Wave devices.
- Control up to 10 rooms, each room allows max of 20 devices.
- Control up to 20 scenes, each scene allows 6 events and 6 actions.
- Allows alarm notification for each Z-Wave devices and each scene.
- Pan/tilt control.
- Plug & play by ID/password, no IP address or DNS settings.
- H.264 video compression
- Mega-pixel for up to 1280x800 resolution at 30 fps.
- Two sensors/lens for day and night separately.
- Two way audio.
- SD card video recording with 5 seconds of pre-recording..
- 802.11 n wireless with WEP and WPA/WPA2 security support.
- WPS (WiFi Protected Setup) support.
- Triple video streaming on PC, mobile and SD card recording.
- Night mode control – support automatic, manual and scheduled modes.
- Connect up to 20 users simultaneously
- Bundle with free video management software CamView.
- Push notification on iPhone/iPad and Android for motion and sound detection.
- Email/ftp alarm message for motion and sound detection.
- Event scheduling.
- Video recording on NAS device.
- Internal real time clock
- Watchdog function to prevent system failure.

## ***Specifications***

<b>Models</b>	Dual-lens Mega-pixel
<b>Power</b>	DC 5V/1.5A or 12V/1A
<b>Processors</b>	RISC CPU, hardware video processing and compression.
<b>Network interface</b>	Ethernet 10BaseT/100BaseTX, Auto-MDIX, RJ-45
<b>Wireless interface</b>	<p>IEEE 802.11n 90 - 150 Mbps IEEE 802.11g 6 - 54 Mbps IEEE 802.11b 1 - 11 Mbps Transmit power: 14.5dBm typically @ 802.11g 17.5dBm typically @ 802.11b</p> <p>Receiver sensitivity: 54Mbps: Typical -73dBm @ 10% PER 11Mbps: Typical -86dBm @ 10% PER</p> <p>Antenna gain: 0.1 dBi</p>
<b>Z-Wave module</b>	<p>Sigma Design 500 series module Tx RF Power : -26 ~ 2 dBm. Range: 100 meters open site Radio frequency : 868.42 MHz for Europe/China, 908.42 MHz for United States, 921.42 MHz for Australian/New Zealand, 922 MHz for Japan/Taiwan.</p>
<b>Pan/Tilt control</b>	<p>Pan viewing range 340° ( -170° ~ 170° ) Tilt viewing range 130° ( -40° ~ 90° )</p>
<b>Image sensor</b>	<p>RGB Mega 1/4 inch CMOS Day and night separate sensors Automatic exposure control, automatic white balance, automatic gain control, automatic brightness control.</p>
<b>Light sensitivity</b>	<p>0.2 Lux ( IR LED off ) 0 Lux (with 10 meters IR LED on) Automatically turn on the IR LED on low light environment.</p>
<b>Lens</b>	<p>3.3 mm, F2.8, viewing angle: 70°, fixed iris. focus range: 50 cm to infinity Day and night separate lens</p>
<b>Buttons</b>	One reset button, to factory default settings

	One WPS button for automatic WiFi setup
<b>Indicators</b>	<p>One LED for Internet connection status indication</p> <p>One LED for Ethernet connection indication</p> <p>One LED for SD card recording indication</p>
<b>Video compression</b>	H.264, baseline profile level 3.1
<b>Video streaming</b>	Separate frame rate/resolution/bandwidth settings for PC and mobile.
<b>Video settings</b>	<p>Resolution: (WXGA)1280x800, 1024x768, VGA(640x480), QVGA(320x240)</p> <p>Bandwidth : 64k, 128k, 256k, 512k, 768k, 1M, 1.2M, 1.5M, 2M, 3M bps</p> <p>Frame rate : 1~5, 10, 15, 20, 25, 30 fps</p>
<b>Audio</b>	<p>Built-in microphone for audio monitoring</p> <p>Built-in 0.5W speaker for alarm and half-duplex two-way audio.</p> <p>Speaker jack for external speaker</p> <p>Audio compression: G.711</p>
<b>Security</b>	<p>Web management username/password protection</p> <p>Video display ID/password protection</p> <p>WiFi WEP and WPA/WPA2 security mode</p>
<b>Installation, management and maintenance</b>	<p>Plug &amp; play by ID/password.</p> <p>Video management software-CamView for video access and multi-camera management</p> <p>Firmware upgrades via FTP</p>
<b>Web browsing</b>	<p>Built-in web server for standard web browser access</p> <p>Video display on IE browser</p> <p>Video snapshot on any browser</p>
<b>Supported protocols</b>	IPv4, HTTP, TCP, ICMP, RTSP, RTP, UDP, RTCP, SMTP, SNTP, FTP, DHCP, ARP, DNS, PPPoE, etc.
<b>Accessories (included)</b>	Power adaptor, RJ45 Ethernet cable, quick installation guide, CD with installation software and User's Manual, ID/Password card.
<b>App software</b>	iPhone and Android App available
<b>Users</b>	Up to 20 simultaneous unicast users (depends on video settings)

<b>Alarm and event management</b>	Events triggered by motion and sound detection Email/ftp alarm message Push notification on iPhone/iPad and Android devices.
<b>Dimensions (HxWxD) and weight</b>	117 x 80 x 75 mm, 280 g, camera body only
<b>Approvals</b>	EMC - CE, FCC Part 15 Subpart B Class B Wireless RF - CE, FCC Part 15 Subpart C Power supply: CE, FCC, UL, EN 60950
<b>Operating conditions</b>	0-50 °C Humidity 20 – 80% RH (non-condensing)

## Z-Wave Power Plug PAN11 Specification

Follow Z-Wave Plus standard	
Power on/off control	
Power meter report	
Also worked as repeater	
Maximum Load	13A, LED flashes on 0.2 second interval when overloaded
Range	30m indoor, 70m open site
Operating temperature	0-40 °C
Approvals	EMC - CE, FCC Part 15 Subpart B Class B Wireless RF - CE, FCC Part 15 Subpart C

PAN11-1B	Germany
PAN11-2B	France
PAN11-3B	UK
PAN11-5B	US
PAN11-8B	China

## Z-Wave 4in1 Sensor PST02-A Specification

Follow Z-Wave Plus standard	
4in1 sensors	PIR, door/window sensor, temperature sensor, illumination sensor Will update temperature report when temperature changed +1°F
Battery Type	CR123A, 3.0V
Battery Life	two years

Range	30m indoor, 70m open site
Operating temperature	0-40 °C
Approvals	EMC - CE, FCC Part 15 Subpart B Class B Wireless RF - CE, FCC Part 15 Subpart C